

Cytotechnology

Volume 20, Nos. 1-3, 1996

**Special Issue: Insect Cell Cultures:
Fundamental and Applied Aspects**

Guest Editors: J.M. VLAK, C.D. de GOOIJER, J. TRAMPER and H.G. MILTENBURGER

Preface	1
Development and characterization of insect cell lines Dwight E. Lynn	3-11
New approaches to insect tissue culture Danica Baines	13-22
Transgenic insect cells: mosquito cell mutants and the dihydrofolate reductase gene Ann Marie Fallon	23-32
Insect cell physiology Ravinder Bhatia, Gary Jesionowski, Jerome Ferrance & Mohammad M. Ataai	33-41
Insect cell cultivation: growth and kinetics Georg Schmid	43-55
Medium design for insect cell culture Ernst-Jürgen Schlaeger	57-70
Baculovirus - Insect cell interactions Gary W. Blissard	73-93
Replication patterns and cytopathology of cells infected with baculoviruses Greg V. Williams & Peter Faulkner	95-110
Construction of baculovirus recombinants Paul A. Kitts	111-123
Passage effect of virus infection in insect cells Peter J. Krell	125-137
Post-translational modifications in insect cells Hans-Dieter Klenk	139-144
Productivity of insect cells for recombinant proteins James E. Maruniak	145-148
Chaperone and foldase coexpression in the baculovirus-insect cell expression system Michael J. Betenbaugh, Eric Ailor, Erik Whiteley, Paul Hinderliter & Tsu-An Hsu	149-160
Shear sensitivity of insect cells Jeffrey J. Chalmers	163-171
Insect cell bioreactors Spiros N. Agathos	173-189
Perfusion for the production of recombinant proteins in insect cells Volker Jäger	191-198
Immobilization of insect cells Jian-Yong Wu & Mattheus F. A. Goosen	199-208
Modelling baculovirus infection of insect cells in culture John Francis Power & Lars Keld Nielsen	209-219

Scale up aspects of sparged insect-cell bioreactors J. Tramper, J.M. Vlak & C.D. de Gooijer	221-229
Oxygen gradients in small and big sparged insect-cell bioreactors J. Tramper, J.M. Vlak & C. D. de Gooijer	231-238
Downstream processing of insect cell cultures Alain R. Bernard, Manjula Lusti-Narasimhan, Kathryn M. Radford, Richard S. Hale, Eric Seville & Pierre Graber	239-257
Parvovirus diagnostics and vaccine production in insect cells José Ignacio Casal	261-270
Classical swine fever virus diagnostic and vaccine production in insect cells Marcel M. Hulst & Rob J.M. Moormann	271-277
Production of multidomain complement glycoproteins in insect cells Marcel M. Hulst & Rob J.M. Moormann	279-288
Economics of baculovirus – insect cell production systems David J. Rhodes	291-297
Safety aspects of insect cell culture G. Stacey & R. Possee	299-303
Regulatory issues in the use of insect-cell culture Frank L.J. van Lier	305-309
List of Contributors	
Keyword Index	

